



**KUVEMPU UNIVERSITY**  
**OFFICE OF THE DIRECTOR**  
**DIRECTORATE OF DISTANCE EDUCATION**

Jnana Sahyadri, Shankaraghatta – 577 451, Karnataka

Ph: 08282-256246, 256426; Fax: 08282-256370; Website: www.kuvempuuniversitydde.org

E-mail: info@kuvempuuniversitydde.org, ssgc@kuvempuuniversitydde.org



**TOPICS FOR INTERNAL ASSESSMENT ASSIGNMENTS - 2010-11**

**B.Sc. First Year (PCM & CBZ)**

**General Note:** *Students are advised to read the separate enclosed instructions before beginning the writing of assignments.*

**Part I: Topics in Language Papers**

*(Students to submit IAs of TWO Language Papers, which they have chosen at the time of admission to the Course, and among them, one should be English)*

**ಕನ್ನಡ**

(ಭಾಷಾ ಪತ್ರಿಕೆ)

1. 'ಬೆಟ್ಟದ ಜೀವ' ಕಾದಂಬರಿಯಲ್ಲಿ ಗೋಪಾಲಯ್ಯ ಮತ್ತು ಶಂಕರಮ್ಮನ ದಾಂಪತ್ಯ ಜೀವನದ ಸೊಗಸನ್ನು ವಿವರಿಸಿ. 10 ಅಂಕಗಳು
2. ಸುತ್ತೋಲೆ ಎಂದರೇನು? ಸುತ್ತೋಲೆಯ ಮಾದರಿಯೊಂದನ್ನು ರಚಿಸಿ. 05 ಅಂಕಗಳು

**ENGLISH**

(Language Paper)

1. Write a note on Sonnet form. Critically analyse any one of the sonnets prescribed for your study. 10 Marks
2. Write a critical appreciation of the story "The Diamond Necklace". 05 Marks

**हिन्दी (भाषा) HINDI (Language Paper)**

1. 'अकेली' कहानी में अभिव्यक्त नारी की विडम्बनाओं को उद्धाटित कीजिए। 10 Marks
2. कवि नागार्जुन का परिचय देते हुए "बादल को घिरते देखा है" कविता की समीक्षा कीजिए। 05 Marks

**SANSKRIT**

(Language Paper)

1. ವಿಶ್ವತ ಚರಿತೆಯನ್ನು ಸಂಕ್ಷೇಪಿಸಿ ನಿಮ್ಮ ಮಾತುಗಳಲ್ಲಿ ಬರೆಯಿರಿ.  
Summarise Visrutacarita in your own words. 10 Marks
2. ವಾಲ್ಮೀಕಿಯು ಸೀತೆಯನ್ನು ಹೇಗೆ ಸಂತ್ಯಸಿದನು.  
How did Valmiki Console Sita. 05 Marks

**URDU**

*(Answer both the Topics. Topic 1 carries 10 marks, and topic 2 carries 5 marks)*

1. منتری جی کو ریل کے ڈبے میں داخل ہونے کے لئے کن مصیبتوں کا سامنا کرنا پڑا؟
2. پریم چند کے افسانے کفن کا تنقیدی جائزہ لیجئے؟

## Part II: Topics in Optional Papers

- Note: 1. Students to submit Internal Assignments of THREE Optional Papers (PCM or CBZ) in accordance with the combination opted by them.*
- 2. Out of 15 Internal Assignment marks per **Optional Paper** (For P, C, B &Z), 5 marks are earmarked for the attendance of the student at the Counseling/ Contact/ Practical Programme. Therefore, the topics given below are only for 10 marks each paper. Also note that for Mathematics paper, IA marks are 30 and hence topics are given for 25 marks.*

### PHYSICS

Topic Number	<i>Answer ALL the topics/questions</i>	Marks
1.	Explain the origin of weightlessness in an artificial satellite.	<b>02</b>
2.	Obtain the expression for instantaneous velocity of a particle executing a linear SHM.	<b>03</b>
3.	a) Explain the changes observed in the radiation emitted by a black body when its temperature is increased from 27°C to 177°C.	<b>02</b>
	b) The length of metallic wire is L <sub>1</sub> , when the tension in the wire is T <sub>1</sub> and L <sub>2</sub> when the tension is T <sub>2</sub> . Find the original length of the wire.	<b>03</b>

### MATHEMATICS

Topic Number	<i>Answer ALL the topics/questions</i>	5x5=25 Marks
1.	Show that the following pairs of curves intersect orthogonally	
	a) $r = a(1 + \sin \theta)$ , $r = b(1 - \sin \theta)$ .	
	b) $\frac{2a}{r} = 1 + \cos \theta$ $\frac{2b}{r} = 1 - \cos \theta$	
2.	Find where the line $x = 2 + t$ , $y = 3 - t$ , $z = t$ meets the sphere $x^2 + y^2 + z^2 = 9$ .	
3.	Find the surface area of revolution formed by revolving the curve $r = 2a \cos \theta$ about the initial line.	
4.	Verify whether the system of equations is consistent, if consistent, solve it.	
	$2x + y - 3z = 7$ ;	
	$x + 3y + 4z = 11$ ;	
	$4x + 2y - 6z = 14$ ;	
5.	Prove that $\int_0^{\frac{\pi}{2}} \frac{\sqrt{\tan x}}{1 + \sqrt{\tan x}} dx = \frac{\pi}{4}$ .	

### CHEMISTRY

Topic Number	<i>Answer ALL the topics/questions</i>	Marks
1.	Explain the significance of four quantum numbers.	<b>04</b>
2.	In a mixture of liquids, liquid A is steam volatile, and decomposes at its boiling point. Explain the method of separating liquid A from the mixture, with physical principles involved.	<b>03</b>

3. Benzene reacts with an alkyl halide, in the presence of anhydrous Aluminium chloride to give alkyl benzene. Discuss the mechanism of this reaction. **03**

### **BOTANY**

<b>Topic Number</b>	<i>Answer ALL the questions. Draw diagrams wherever necessary</i>	<b>Marks</b>
1.	Give an account of Lichens and add a note on its economic importance	<b>05</b>
2.	Describe the morphology of equisetum.	<b>05</b>

### **ZOOLOGY**

<b>Topic Number</b>	<i>Answer ALL the questions. Draw diagrams wherever necessary</i>	<b>Marks</b>
1.	Explain the structure and life cycle of <i>Plasmodium vivax</i> .	<b>05</b>
2.	Mention the salient features of class mammalia and classify them up to sub-classes with examples	<b>05</b>

## **Part III: Topics in Compulsory Paper**

### **ಪರಿಸರ ವಿಜ್ಞಾನ / ENVIRONMENTAL SCIENCE**

1. ನಗರೀಕರಣ ಮತ್ತು ಪರಿಸರದ ಸಮಸ್ಯೆಗಳ ಕುರಿತು ಚರ್ಚಿಸಿ. **10 Marks**
2. ಅಂತರ್ಜಲ ಮಾಲಿನ್ಯದ ಬಗ್ಗೆ ಟಿಪ್ಪಣಿ ಬರೆಯಿರಿ. **05 Marks**
1. Discuss the problems of urbanization and environmental issues. **10 Marks**
2. Write a note on ground water pollution. **05 Marks**